

NATIONAL HEADQUARTERS  
CIVIL AIR PATROL  
500 Fifth Avenue  
New York 18, New York

Com-FIA-s

COMMUNICATIONS DIRECTIVE)  
NO. 6)

12 May 1944

INSTALLATION OF SUTCHELL CARLSON MODEL 591 RADIO RECEIVERS  
IN AAF L-TYPE AIRCRAFT

1. Provision of labor. With the exceptions noted below, all labor contingent upon making the subject installation will be performed by qualified Civil Air Patrol members. Untrained personnel and mechanics having insufficient experience with radio equipment will not be detailed to make this installation. If individuals who are familiar with the operation and maintenance of radio equipment are not available, then arrangements should be made with either a neighboring Wing Commander or else the nearest AAF Supply activity to have the receiver installed.

2. Preparing the receiver position. a. The power supply for the RCA transmitter and receiver is located on the floor to the front of the cockpit beneath the instrument panel. Remove the cover to that power supply (RCA Model AVA 126A).  
b. Using the side of the cover on which the red trade-mark is located, drill a hole which is 5/8th of an inch from the top and 1 1/2 inches from the right side. Use a .082 drill.  
c. Remove the spare fuse mount from the top of the power supply cover.  
d. Relocate the spare fuse mount in the new position that you have just drilled.  
e. Replace the cover.

3. Installing the Model 591 Receiver. a. Strap the battery to the bottom of the receiver by means of the web straps which are riveted to the receiver.  
b. Connect the receiver battery cable to the battery in accordance with the instruction book which accompanies the receiver.  
c. Using a suitable device, fasten the Model 591 Receiver to the AVA 126A power supply. Ascertain that the receiver is fastened securely to the power supply so that it will slide neither forward nor backwards. It is recommended that either shock cord or else a web strap similar to the one attached to the receiver be used.  
d. Operation of the receiver will be facilitated if a wedge is placed beneath the front end of the receiver so that the dial will be tilted upwards.

4. Connecting the antenna. a. Connect the antenna wire which comes with the 591 Receiver to the receiver's antenna binding post.  
b. Run the antenna wire up the left side of the fuselage until the antenna lead which is fastened to the antenna binding post of the RCA Model AVA-20A receiver can be reached. Secure the wire by taping it to safe, convenient points.  
c. Remove the antenna lead from the antenna terminal of the RCA Model AVA-20A receiver.  
d. Connect the 591 antenna to the antenna lead noted in par 4c.  
(Caution: In making this connection, do not cut or modify the RCA antenna lead so that it will be shortened.)



5. The addition, subtraction, or movement of any component part to, from, or within the aircraft shall be noted in the Handbook of Weight and Balance Data, and a new Weight and Balance Form F be accomplished. Your attention is invited to GM-122, "Weight and Balance Data -- AAF Liaison Type Aircraft," and its accompanying attachments.

By direction of National Commander JOHNSON:

*Frank I. Adams*

FRANK I. ADAMS,  
Capt., Air Corps,  
Communications Officer.